

1410 F

cop. 2

UNITED STATES TARIFF COMMISSION

ELECTRICAL COMPONENTS AND APPARATUS AND ALLIED PRODUCTS:  
PRODUCTION AND MAINTENANCE WORKERS OF THE  
F. W. SICKLES DIVISION, GENERAL INSTRUMENT CORPORATION,  
CHICOPEE AND LUDLOW, MASSACHUSETTS

Report to the President on Investigation No. TEA-W-21 Under Section  
301(c)(2) of the Trade Expansion Act of 1962



TC Publication 329  
Washington, D. C.  
July 1970

**UNITED STATES TARIFF COMMISSION**

**Glenn W. Sutton**

**Bruce E. Clubb**

**Will E. Leonard, Jr.**

**George M. Moore**

**Kenneth R. Mason, *Secretary***

-----

**Address all communications to  
United States Tariff Commission  
Washington, D. C. 20436**

-----

TABLE OF CONTENTS

	<u>Page</u>
Introduction-----	1
Finding of the Commission-----	2
Views of Commissioners Sutton and Leonard-----	3
Views of Commissioners Clubb and Moore-----	6
Information obtained in investigation:	
Description of articles under investigation-----	A- 1
U.S. tariff treatment-----	A- 2
U.S. consumption-----	A- 3
U.S. production-----	A- 5
U.S. exports-----	A- 7
U.S. imports-----	A- 7
The General Instrument Corporation:	
The Corporation-----	A-12
The F.W. Sickles Division-----	A-12
* * * * *	
Appendix-----	A-13

Note.--The whole of the Commission's report to the President may not be made public since it contains certain information that could result in the disclosure of the operations of an individual concern. This published report is the same as the report to the President, except that the above-mentioned information has been omitted. Such omissions are indicated by asterisks.

STATISTICAL TABLES

	<u>Page</u>
Table 1.--Tuners and deflection components for television receivers: U.S. production, imports, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970-----	A-14
Table 2.--Tuners for television receivers: U.S. production, imports, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970-----	A-15
Table 3.--Deflection components for television receivers: U.S. production, imports, exports of domestic merchandise and apparent consumption, 1965-69, and January-May 1969 and 1970-----	A-16
Table 4.--Television receivers: U.S. shipments, imports for consumption, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970-----	A-17
Table 5.--Color television receivers: U.S. shipments, imports for consumption, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970-----	A-18
Table 6.--Monochrome television receivers: U.S. shipments, imports for consumption, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970-----	A-19

REPORT TO THE PRESIDENT

U.S. Tariff Commission,  
July 24, 1970

To the President:

In accordance with section 301(f)(1) of the Trade Expansion Act of 1962 (76 Stat. 885), the U.S. Tariff Commission herein reports the results of an investigation made under section 301(c)(2) of the act in response to a petition filed by a group of workers.

On May 25, 1970, the International Brotherhood of Electrical Workers, AFL-CIO-CLC, filed a petition for a determination of eligibility to apply for adjustment assistance on behalf of the production and maintenance workers at the Chicopee and Ludlow, Massachusetts plants of the F.W. Sickles Division, General Instrument Corporation. The Commission instituted the investigation (TEA-W-21) on June 4, 1970, to determine whether, as a result in major part of concessions granted under trade agreements, articles like or directly competitive with the electrical components and apparatus and allied products produced by the F.W. Sickles Division of the General Instrument Corporation are being imported into the United States in such increased quantities as to cause, or threaten to cause, the unemployment or underemployment of a significant number or proportion of the workers of the two plants.

Public notice of this investigation was given in the Federal Register (35 F.R. 8902) on June 9, 1970. A public hearing in connection with this investigation was held on June 23, 1970.

The information herein was obtained from the International Brotherhood of Electrical Workers, AFL-CIO-CLC, and its local Union No. 1500, the F.W. Sickles Division of the General Instrument Corporation, domestic producers of television receivers, the public hearing, the Commission's files, and field work by the staff of the Commission.

#### Finding of the Commission

On the basis of its investigation, the Commission, being equally divided, 1/ makes no finding under section 301(c)(2) of the Trade Expansion Act of 1962 with respect to whether articles like or directly competitive with the electrical components and apparatus and allied products produced by the F.W. Sickles Division are being imported into the United States in such increased quantities as to cause, or threaten to cause, the unemployment or underemployment of a significant number or proportion of the workers at the plants concerned.

---

1/ Commissioners Sutton and Leonard voted in the negative, and Commissioners Clubb and Moore voted in the affirmative.

## Views of Commissioners Sutton and Leonard

Our determination is in the negative for the reason that the conditions imposed by section 301(c)(2) of the Trade Expansion Act of 1962 have not been satisfied. Before an affirmative determination could be made, each of the following conditions would have to be met:

- (1) Articles like or directly competitive with the television components produced at the plants concerned are being imported in increased quantities;
- (2) the increased imports are in major part the result of concessions granted under trade agreements;
- (3) a significant number or portion of the petitioning workers are unemployed or underemployed or are threatened with unemployment or underemployment; and
- (4) the increased imports (resulting in major part from trade-agreement concessions) have been the major factor causing or threatening to cause the unemployment or underemployment.

In our judgment, conditions (1) and (3) have been met in the case at hand. The petitioning workers at the Chicopee and Ludlow plants of the F. W. Sickles Division of the General Instrument Corporation were engaged in the manufacture of tuners and deflection components for television receivers. U.S. imports of such articles--both those imported separately and those imported as part of television receivers--have increased sharply. The annual value of separate tuners and deflection components entered into the United States rose some 350 percent in the 5 years 1965-69. Further, imports of television receivers--and, consequently, imports of tuners and deflection components contained therein--were about 4 times greater in volume in 1969 than in 1965. Meanwhile, the employment of the petitioning workers is down. The Ludlow plant

has been closed and the workers laid off--only 3 years after the plant had been opened. Employment at the Chicopee plant in the manufacture of television receiver components has declined. Indeed, the combined number of workers employed at the two plants that were engaged in the manufacture or processing of tuners and deflection components in 1969 was only about a third of those in 1965. In 1969, moreover, a large share of the employment afforded such workers was in the testing, repairing, and packaging of television receiver components from the Corporation's foreign plants, while only a small share had been so engaged in 1965.

In the mid-1960's the General Instrument Corporation decided to move abroad the bulk of its production of television receiver components. As a result of the corporate decision, the company became the first U.S. manufacturer to establish facilities in Taiwan to produce such components. Currently, it produces tuners and deflection components in Taiwan and Portugal. Part of its output in Taiwan is shipped to television receiver assembly plants of other U.S. manufacturers in the Orient, and part of its output in Portugal is marketed to European television manufacturers. However, the great bulk of the General Instrument Corporation's foreign output of television receiver components \* \* \*

is shipped to the United States for sale to domestic producers of television receivers. \* \* \* Many of the components imported into the United States by the company in 1969 were entered under the provisions of TSUS item 807.00. Under that item, the U.S. duty does not apply to the value of U.S. components contained in the entered articles. \* \* \* In the light of the foregoing, we have concluded



that the decline in employment among the petitioning workers resulted principally from the decision by the management of the General Instrument Corporation to manufacture abroad \* \* \*.

Commissioner Leonard observes further that, in his judgment, the rapidly rising U.S. imports of television receivers, as well as the growing imports of television receiver components by firms other than the General Instrument Corporation, put severe pressure on General Instrument to develop and expand foreign manufacturing facilities. He has concluded, however, that the rise in U.S. imports of such articles has not resulted in major part from concessions granted under trade agreements. The U.S. rate of duty applicable to television equipment, which applies to both receivers and parts thereof, has been reduced substantially--from the 1930 statutory rate of 35 percent ad valorem to the current rate of 7 percent ad valorem. However, the major concessions, accounting for more than two-thirds of the total duty reduction, occurred more than two decades ago--in 1939 and 1948. The recent Kennedy Round concessions have had only a minor effect on the duty, reducing it from 10 percent to 7 percent ad valorem. The recent large increase in U.S. imports of television receivers and components, therefore, could not, in Commissioner Leonard's view, have been caused in major part by the trade-agreement concessions.

## Statement of Commissioners Clubb and Moore

This is a workers adjustment assistance case. On May 25, 1970, the International Brotherhood of Electrical Workers AFL-CIO filed a petition for adjustment assistance under section 301(a)(2) of the TEA <sup>1/</sup> on behalf of the production and maintenance workers at the Chicopee and Ludlow, Massachusetts, plants of the General Instrument Corporation. The Chicopee and Ludlow plants produced, among other things, television tuners and deflection components until the late 1960s when the General Instrument Corporation transferred most of these operations to Taiwan and Portugal. General Instrument now imports from these countries the television tuners and deflection components which were formerly produced at Chicopee and Ludlow. Petitioner contends that, as a result of these events, the workers formerly employed in the production of these articles at the Chicopee and Ludlow plants are eligible for adjustment assistance under section 301 of the Trade Expansion Act. We agree.

The Tariff Commission has frequently ruled that the Trade Expansion Act provides four requirements for workers' relief:

- (1) Imports must be increasing;

---

<sup>1/</sup> Section 301(a)(2) reads as follows:

A petition for a determination of eligibility to apply for adjustment assistance under chapter 2 may be filed with the Tariff Commission by a firm or its representative, and a petition for a determination of eligibility to apply for adjustment assistance under chapter 3 may be filed with the Tariff Commission by a group of workers or by their certified or recognized union or other duly authorized representative.

- (2) The imports must be a result in major part of concessions granted under trade agreements;
- (3) The workers producing the like or directly competitive article must be underemployed or unemployed, or threatened with underemployment or unemployment; and
- (4) The increased imports resulting from trade agreement concessions must be the major factor in causing or threatening to cause the unemployment or underemployment.

Each of these requirements is met in this case.

#### Increased Imports

It is clear that this requirement of the statute has been met. Imports of television tuners and deflection components increased from \$15 million in 1965 to \$53 million in 1969. This increase took place at a time when apparent consumption in the United States was declining irregularly so that the portion of the market served by imports increased from 8% in 1965 to 37% in the first six months of 1970.

Moreover, imports of television sets have also increased rapidly in recent years -- from 1 million sets in 1965 to 4 million sets in 1969. Since each finished set contains the tuners and deflection components which are the subject of this investigation, it is clear that a substantial quantity of these components are imported in the finished sets.

In Major Part

The second requirement of the statute is that the increased imports must have resulted in major part from trade agreement concessions. In previous cases we have ruled that this requirement of the statute is satisfied if, but for the concessions, imports would not be at substantially their present level. <sup>2/</sup>

It seems clear that if it had not been for the concessions, imports could not have reached anywhere near their present level. Since 1930 the applicable rate of duty has been reduced progressively from 35% ad valorem to 7%. By 1972 it is scheduled to be further reduced to 5%. Information assembled by the Commission indicates that there is a wide difference between the cost of imported television components and those which are produced domestically. Calculations made by the Commission indicate that if the 1930 rate had not been reduced, however, the price of the imported components would be very near that of the domestically produced components. <sup>3/</sup> \* \* \*

---

<sup>2/</sup> Eyeglass Frames, Inv. No. TEA-I-10 (October 1967) at 14-16 (concurring opinion); Barbers' Chairs, Inv. No. TEA-I-11 and TEA-F-7 and 8 (January 1968) at 27, 32-38 (dissenting opinions); Buttweid Pipe, Inv. No. TEA-W-8 (November 1969) at 8-11.

<sup>3/</sup> Parts for television tuners and deflection components are frequently made in the United States and shipped abroad for assembly. Pursuant to section 807 of the TSUS, when the finished article is re-imported, it is taxed only on the value added abroad. This factor was taken into consideration in calculating the effect of the tariff reductions.

Accordingly, it seems clear that had it not been for the concessions, imports of tuners and deflection components could not have reached substantially their present level and, therefore, for purposes of this statute, the increased imports have resulted in major part from the concessions.

#### Underemployment or Unemployment

There is no doubt that this requirement of the statute has been met. The petition was filed on behalf of the production and maintenance workers at the Chicopee and Ludlow plants. The Ludlow plant has been closed, and employment in the television components portion of the Chicopee plant has been considerably reduced. \* \* \* Accordingly, it is clear that a significant number of workers at these two plants have become unemployed or underemployed within the meaning of the statute.

#### Major Factor

The final requirement of the statute is that the concession-generated increased imports must be the major factor in causing the unemployment or underemployment of the workers involved. Here, too, the "but for" test is applicable. Thus, if the unemployment or underemployment would not have occurred had it not been for the increased imports, then for purposes of this statute, the increased imports have been the major factor in causing the unemployment or underemployment.

A more direct relationship between the increased imports of television tuners and deflection components and the unemployment of the workers involved here could hardly be found. The employer, faced with vigorous competition from imported components, which became constantly more attractive to purchasers as the duty was reduced, finally elected to cease the production of most of these components in the United States and to become an importer himself. It thus seems clear that, had it not been for the concession-generated increased imports -- a portion of which were brought in by General Instrument itself, the workers would not have become unemployed. Accordingly, for purposes of this statute, the increased imports have been the major factor in causing the unemployment.

#### Conclusion

Since all of the requirements of the statute have been met, we find that the workers upon whose behalf the petition was filed are eligible to apply for adjustment assistance.

Information Obtained in Investigation

Description of articles under investigation

The F.W. Sickles Division of the General Instrument Corporation manufactures television receiver components, delay lines and pulse forming networks required in electronic bomb fuses, and special order electronic components for other manufacturers. Nearly all of these products are complicated assemblies which require relatively high proportions of labor, as opposed to capital input in their manufacture.

Only the television receiver components manufactured by the division are the subject of the petition; according to both union and company officials, import competition is not a serious factor in their industrial electronic activity and it is, of course, not a relevant factor on bomb fuses and their parts.

The television components manufactured at Chicopee and Ludlow consist of tuners and deflection components for television receivers. The tuners are of two types: very high frequency (VHF) and ultrahigh frequency (UHF). They are used in television receivers to select channels and to amplify the signal from the transmitting station. Since 1963, all television receivers sold in the United States are required, by law, to be able to receive both VHF and UHF signals. Thus, each television receiver

manufactured in the United States or imported into the United States contains both a VHF and UHF tuner.

Deflection components position the electron beam(s) in a television receiver in order to reproduce the transmitted image on the display tube. For the purposes of this report deflection components are considered to include: deflection yokes, focus coils, flyback transformers, color convergence assemblies, lateral purity assemblies, color delay lines, vertical output transformers, and pin cushion assemblies. Of the above listed deflection components, only vertical output transformers have not been manufactured at Chicopee or Ludlow since 1965. Data on vertical output transformers are specifically excluded from the data on deflection components used in this report.

#### U.S. tariff treatment

Prior to January 1, 1950, imports, if any, of television receivers and parts were included for tariff purposes with radio receivers in Tariff Paragraph 353. From 1950 to the effective date of the Tariff Schedules of the United States (TSUS), August 31, 1963, television receivers and parts were separately identified as television apparatus under Paragraph 353. Under the TSUS, television receivers and parts are classified under item 685.20.

The statutory rate of duty applicable to television receivers and parts, 35 percent ad valorem, was reduced to 25 percent in 1939 as a result of a bilateral agreement with the United Kingdom, and was further



reduced to 15 percent in 1948 as a result of negotiations under the General Agreement on Tariffs and Trade (GATT). Subsequent reductions pursuant to GATT concessions reduced the duty to 12.5 percent in 1951, 10.5 percent in 1958, and 10 percent in 1962. Under the Kennedy Round the rate of duty was reduced by 50 percent, phased over a 5-year period. The final Kennedy Round rate of duty effective January 1, 1972, will be 5 percent ad valorem; the current rate is 7 percent.

In addition to the above TSUS items, which are subject to trade agreement concessions, General Instrument and other electronic companies are making extensive use of TSUS item 807.00. Under the provisions of this item, which has never been the subject of a trade agreement concession, articles assembled abroad in whole or in part of U.S. fabricated components are dutiable only on the value added abroad, the value of U.S. components incorporated being duty-free.

#### U.S. consumption

The annual value of tuners and deflection components used in the manufacture of television receivers in the United States (hereafter referred to as "consumption") increased from \$185 million in 1965 to \$222 million in 1966, but then declined irregularly to \$205 million in

1969 (see table 1). In January-May 1970 the "consumption" of television tuners and deflection components was almost 31 percent lower than it had been during the comparable period of 1969. The variations in U.S. "consumption" of television tuners and deflection components from year to year were directly related, of course, to variations in U.S. production of television receivers. The quantity of apparent U.S. "consumption" of television tuners and the U.S. production of television receivers, 1965-69, and January-May 1969 and 1970, as taken from tables 2 and 4, are shown below:

	<u>U.S. apparent</u> <u>"consumption" of</u> <u>television</u> <u>tuners</u> (1,000 tuners)	<u>U.S. production</u> <u>of television</u> <u>receivers</u> (1,000 receivers)
1965-----	20,692	10,216
1966-----	23,803	12,696
1967-----	19,599	10,385
1968-----	21,217	10,999
1969-----	<b>20,352</b>	10,078
Jan.-May 1969-----	8,438	3,895
Jan.-May 1970-----	5,882	2,750

The irregular decline in U.S. "consumption" of tuners and deflection components following 1966, as well as in U.S. production of television receivers, occurred during a period of increasing imports of television receivers from abroad. An increasing share of the annual purchases of

television receivers by U.S. consumers has consisted of imported television receivers. Consumers purchased 11 million receivers in 1965; 14 million receivers in 1966, 12 million receivers in 1967 and 14 million receivers in 1968 and 1969 (see table 4). As noted above, the market for tuners and deflection components is directly dependent upon the manufacture of television receivers in the United States. Imports of television receivers, thus, indirectly affect the U.S. market for tuners and deflection components.

#### U.S. production

The value of U.S. production of tuners and deflection components for television receivers increased from \$175 million in 1965 to \$194 million in 1966, but declined thereafter to \$161 million in 1969 (see table 1). Production during the first five months of 1970 was down by 39 percent from the comparable period of 1969.

U.S. production of tuners for television receivers declined from 18 million tuners in 1965 to 15 million in 1967, increased again to 18 million in 1968 and declined to 16 million in 1969 (table 2). During the first 5 months of 1969 such production amounted to 7 million units but in the same period of 1970 it amounted only to 4 million. The decline in U.S. production of tuners for television receivers reflects, at least in part, the movement of U.S. producers abroad. Among the producers who have moved abroad is the General Instrument Corporation, which has

described itself as "the world's largest producer of tuners." <sup>1/</sup>

U.S. production of deflection components for television receivers increased from a value of \$69 million in 1965 to \$95 million in 1966, but declined thereafter to \$76 million in 1969; such production amounted to \$34 million during January-May 1969, and to \$23 million during the comparable period of 1970 (table 3).

U.S. production of television receivers increased from 10.2 million receivers in 1965 to 12.7 million in 1966, but since 1966 (the highest year during the period 1965-69) it declined to 10.1 million receivers in 1969; production amounted to 2.8 million units in the first five months of 1970 compared with 3.9 million in the corresponding period of 1969 (table 4). U.S. production of color television receivers increased from 2.7 million receivers in 1965 to about 6 million sets in 1968; 1969 production amounted to 5.8 million sets (table 5). Meanwhile production of monochrome receivers declined from more than 7 million receivers a year in 1965 and 1966 to 4.3 million receivers in 1969 (table 6). Both color and monochrome television receivers use the components manufactured by F.W. Sickles, but the components used in color televisions are generally more complex. The changing mix of television receiver production between monochrome and color receivers has resulted in a changing mix of components.

---

<sup>1/</sup> \* \* \*

U.S. exports

U.S. exports of tuners for television receivers declined from about 500,000 tuners valued at \$5 million in 1965 to about 200,000 units valued at \$3 million in 1967 (table 2). Exports increased, however, to 2.3 million tuners valued at \$5.5 million in 1968 and to 3.7 million units valued at \$8.7 million in 1969. \* \* \* Some exports may be of partially assembled tuners which were further assembled abroad for return to the United States under item 807.00 without being incorporated into a television receiver.

No data on exports of deflection components for television receivers are available. Such exports probably account for only a small proportion of U.S. shipments.

U.S. exports of television receivers amounted to about 1 percent of the quantity and value of U.S. production during 1965-69. Exports ranged erratically between 139,000 and 181,000 receivers per year during the period (table 4).

U.S. imports

Annual U.S. imports of tuners and deflection components for television receivers (imported separately, not in television receivers) increased during the period 1965-69 almost four-fold. <sup>1/</sup> Imports of

---

<sup>1/</sup> Data on U.S. imports of tuners and deflection components for television receivers were not reported separately in official U.S. statistics prior to January 1, 1970. Such data, for tuners alone, have been reported separately since that time. The data used in this section are derived from data on the use of imported television components in U.S. manufactured receivers that the Commission obtained from domestic manufacturers.

such components were valued at \$15 million in 1965 and \$53 million in 1969; imports during the first 5 months of 1969 and 1970 were about equal (table 1). In 1965 the value of imported tuners and deflection components accounted for about 8 percent of the "consumption" of such components in the United States; the corresponding ratio in 1969 was 26 percent. In more recent years, a substantial share of the U.S. imports have been supplied by the foreign manufacturing facilities of the U.S. producers.

U.S. imports of tuners for television receivers (imported separately) increased from 2.8 million tuners in 1965 to 7.8 million tuners in 1969 (table 2). Imports during the first 5 months of 1970 were not appreciably different from the imports during the same period of 1969. Imported tuners accounted for about 14 percent of U.S. "consumption" in 1965, compared with 38 percent in 1969; the corresponding ratio for the period January-May 1970 was 55 percent. The average unit value of such imports declined from \$4.86 each in 1965 to \$3.85 each in 1969. The Commission does not have information at this time to indicate whether the change in average unit values reflected an actual decline in prices during the period under consideration or a changing product mix between less expensive UHF and more expensive VHF tuners.

U.S. imports of deflection components for television receivers increased greatly between 1965 and 1969, rising from a value of \$1.7 million in 1965 to \$23 million in 1969 (table 3). The imported

components accounted for about 2 percent of "consumption" in 1965 and 23 percent in 1969. Imports of such components in the period January-May 1970 were about 8 percent smaller than in January-May 1969. Production of deflection components declined sharply in the early months of 1970, increasing the ratio of imports to "consumption" to 28 percent.

U.S. imports of television receivers have increased each year since 1965. Annual imports increased from a million receivers, or 9.5 percent of all receivers purchased by U.S. consumers in 1965, to 4 million receivers, or 29 percent of all receivers purchased by U.S. consumers in 1969 (table 4). In recent years, an increasing share of the television receivers imported into the United States has been of "domestic label," i.e., those manufactured abroad, by or for a U.S. producer of television receivers. U.S. imports of television receivers

by U.S. label and foreign label, for the period 1965-69, are as follows:

(Quantity in 1,000 receivers)

Year	U.S. imports for consumption					
	U.S. label			Foreign label	Total <u>4/</u>	
	Built to U.S. manufacturers specifications <u>1/</u>	Other <u>2/</u>	Total <u>3/</u>			
1965-----	***	***	704	344	1,048	
1966-----	***	***	1,011	511	1,522	
1967-----	***	***	903	711	1,614	
1968-----	***	***	1,247	1,461	2,708	
1969-----	801	860	1,661	2,373	4,034	

1/ Receivers which are virtually identical to those manufactured by U.S. firms in the United States. Derived from data supplied to the U.S. Tariff Commission by 8 of the 9 largest U.S. producers of television receivers, accounting for 78 percent of U.S. producers' sales of domestic label television receivers.

2/ Receivers which are not identical to those manufactured by U.S. firms in the United States. Derived by subtracting the data in column 1 from the data shown in column 3.

3/ Obtained from the Electronics Industries Association.

4/ Obtained from the official statistics of the U.S. Department of Commerce.

Total U.S. imports of tuners and deflection components for television receivers under TSUS item 807.00 in 1968 and 1969 are shown in



the following tabulation, in thousands of dollars:

Commodity	(1) Total im- ports	807.00 imports		(4) Foreign value (duti- able)	(5) Ratio (percent) of imports under item 807.00 to total imports (col.2÷col. 1)	(6) Ratio (percent) of duty-free im- ports under item 807.00 to total im- ports under item 807.00 (col.3 ÷ col.2)
		(2) Total value	(3) U.S. value (duty-free)			
1968						
Tuners-----	22,821	19,172	10,899	8,273	84.0	56.8
Deflection components---	15,359	***	***	***	***	***
Total-----	38,180	***	***	***	***	***
1969						
Tuners-----	29,811	22,062	13,110	8,952	74.0	59.4
Deflection components---	22,990	***	***	***	***	***
Total-----	52,801	***	***	***	***	***

Source: Compiled from data supplied by the U.S. Department of Commerce.

Imports of television receivers under the provisions of TSUS item

807.00 in 1968 and 1969, were as follows (in thousands of dollars):

Commodity	(1) Total im- ports	807.00 imports		(4) Foreign value (duti- able)	(5) Ratio (percent) of imports under item 807.00 to total imports (col.2÷ col.1)	(6) Ratio (percent) of duty-free im- ports under item 807.00 to total im- ports under item 807.00 (col.3 ÷ col.2)
		(2) Total value	(3) U.S. value (duty-free)			
1968-----	203,771	21,633	5,847	15,786	10.6	27.0
1969-----	295,781	47,003	17,724	29,279	15.9	37.7

Source: Compiled from data supplied by the U.S. Department of Commerce.

General Instrument Corporation

The Corporation.--General Instrument Corporation, of Newark, New Jersey, listed among Fortune's largest 500, is a multinational conglomerate with domestic operations in 13 States and foreign operations in Canada, Mexico, Europe, and the Far East. The company's diverse operations are organized by "groups." Today there is a

semiconductor products group,  
cable TV systems and products group,  
entertainment electronic products group,  
defense and engineering products group,  
electromechanical products group,  
totalisator systems group,  
electro-optical products group, and  
capacitor products group.

Of the company's 25,000 employees, roughly half are employed in the United States and half abroad.

The F.W. Sickles Division.--The F.W. Sickles Division of the General Instrument Corporation is an integral part of the corporation's Entertainment Electronic Products Group. The F.W. Sickles Division currently is a multi-product manufacturer of complex electronic components for television receivers, computers, and defense products. The division, with annual sales of close to \$50 million, currently operates a plant in Chicopee, Massachusetts and formerly operated a plant in Ludlow, Massachusetts. Prior to being absorbed by the General Instrument Corporation in December 1945, the division was the F.W. Sickles Corporation.

\* \* \* \* \*

Appendix

Statistical Tables

Table 1.--Tuners and deflection components for television receivers: U.S. production, imports, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970

(Value in thousands of dollars)

Year	U.S. production <u>1/</u>	U.S. imports <u>2/</u>	U.S. exports of domestic merchandise <u>3/</u>	Apparent "consumption" <u>4/</u>	Ratio (percent) of imports to consumption
1965-----	174,926	15,299	5,126	185,099	8.26
1966-----	194,342	32,447	4,459	222,330	14.59
1967-----	192,687	27,074	2,962	216,799	12.49
1968-----	187,024	38,180	5,453	219,751	17.37
1969-----	161,337	52,801	8,693	205,445	25.70
Jan.-May 1969--	69,222	22,149	3,984	87,387	25.35
Jan.-May 1970--	41,898	22,209	3,396	60,711	36.58

1/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of domestically produced tuners and deflection components for television receivers manufactured in the United States plus exports of domestically produced tuners not incorporated in television receivers. Exports of deflection components are not known and production figures are understated by the omission of such production for export.

2/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of imported tuners and deflection components for television receivers manufactured in the United States.

3/ Figures represent exports of tuners for television receivers only; exports of deflection components are not known, but are probably small in relation to exports of tuners. Figures do not include exports of tuners incorporated in television receivers. Source: Official statistics of the U.S. Department of Commerce.

4/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of tuners and deflection components for television receivers manufactured in the United States.

Source: Estimated on the basis of data supplied to the U.S. Tariff Commission by 8 of the 9 largest U.S. producers of television receivers.

\* \* \*

Table 2.--Tuners for television receivers: U.S. production, imports, exports of domestic merchandise and apparent consumption, 1965-69, and January-May 1969 and 1970

Year	U.S. production <u>1/</u>	U.S. imports <u>2/</u>	U.S. exports: of domestic merchandise <u>3/</u>	Apparent "consumption" <u>4/</u>	Ratio (percent) of imports to consumption
Quantity (1,000 tuners)					
1965-----	18,396	2,800	504	20,692	13.53
1966-----	17,806	6,372	375	23,803	26.77
1967-----	15,105	4,711	217	19,599	24.04
1968-----	17,662	5,896	2,341	21,217	27.79
1969-----	16,342	7,750	3,740	20,352	38.08
Jan-May 1969--	7,030	3,307	1,899	8,438	39.19
Jan-May 1970--	4,471	3,222	1,811	5,882	54.78
Value (1,000 dollars)					
1965-----	106,053	13,599	5,126	114,526	11.87
1966-----	98,987	26,884	4,459	121,412	22.14
1967-----	101,296	20,262	2,962	118,596	17.08
1968-----	100,025	22,821	5,453	117,393	19.44
1969-----	85,320	29,811	8,693	106,438	28.01
Jan-May 1969--	35,252	12,534	3,984	43,802	28.62
Jan-May 1970--	18,982	13,334	3,396	28,920	46.11
Average unit value (dollars per tuner) <u>5/</u>					
1965-----	5.76	4.86	10.17	5.53	xxxx
1966-----	5.56	4.22	11.90	5.10	xxxx
1967-----	6.71	4.30	13.63	6.05	xxxx
1968-----	5.66	3.87	<u>6/</u> 2.33	5.53	xxxx
1969-----	5.22	3.85	2.32	5.23	xxxx
Jan-May 1969--	5.01	3.79	2.10	5.19	xxxx
Jan-May 1970--	4.25	4.14	1.88	4.92	xxxx

1/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of domestically produced tuners for television receivers manufactured in the United States plus exports of domestically produced tuners not incorporated in television receivers.

2/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of imported tuners for television receivers manufactured in the United States.

3/ Obtained from official statistics of the U.S. Department of Commerce.

4/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of tuners and deflection components for television receivers manufactured in the United States.

5/ Based on unrounded production, import and consumption data.

6/ \* \* \*

Source: Estimated on the basis of data supplied to the U.S. Tariff Commission by 8 of the 9 largest U.S. producers of television receivers. \* \* \*

Table 3.--Deflection components for television receivers: U.S. production, imports, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970

(Value in thousands of dollars)

Year	U.S. production <u>1/</u>	U.S. imports <u>2/</u>	U.S. exports of domestic merchandise	Apparent "consumption" <u>3/</u>	Ratio (percent) of imports to consumption
1965-----	68,873	1,700	<u>4/</u>	70,573	2.41
1966-----	95,355	5,563	<u>4/</u>	100,918	5.51
1967-----	91,391	6,812	<u>4/</u>	98,203	6.94
1968-----	86,999	15,359	<u>4/</u>	102,358	15.00
1969-----	76,017	22,990	<u>4/</u>	99,007	23.22
1969 (Jan.-May)---	33,970	9,615	<u>4/</u>	43,585	22.06
1970 (Jan.-May)---	22,916	8,875	<u>4/</u>	31,791	27.92

1/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of domestically produced deflection components for television receivers manufactured in the United States. Data on exports of deflection components not incorporated in television receivers are not known and production figures are understated by the amount of such exports which are not thought to be large in relation to production.

2/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of imported deflection components for television receivers manufactured in the United States.

3/ Figures are derived from statistics on the use of television components; that is the use by domestic television receiver manufacturers of deflection components for television receivers manufactured in the United States.

4/ Not available. Thought to be small in relation to U.S. production, imports, and consumption.

Source: Estimated on the basis of data supplied to the U.S. Tariff Commission by 8 of the 9 largest U.S. producers of television receivers. \* \* \*

Table 4.--Television receivers: U.S. shipments, imports for consumption, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970

Year	U.S. shipments <sup>1/</sup>	U.S. imports for consumption <sup>2/</sup>	U.S. exports of domestic merchandise	Apparent consumption	Ratio (percent) of imports to consumption
Quantity (1,000 receivers)					
1965-----	10,216	1,048	181	11,083	9.46
1966-----	12,696	1,522	168	14,050	10.83
1967-----	10,385	1,614	139	11,860	13.61
1968-----	10,999	2,708	144	13,563	19.97
1969-----	10,078	4,034	157	13,955	28.91
Jan-May 1969-----	3,895	1,313	54	5,154	25.48
Jan-May 1970-----	2,750	1,497	42	4,205	35.60
Value (1,000 dollars)					
1965-----	1,748,284	59,586	21,261	1,786,609	3.34
1966-----	2,544,674	115,733	26,291	2,634,116	4.39
1967-----	2,452,544	125,582	23,577	2,554,549	4.92
1968-----	2,570,864	203,771	27,771	2,746,864	7.42
1969-----	2,327,793	295,781	33,287	2,590,287	11.42
Jan-May 1969-----	858,798	95,306	11,674	942,430	10.11
Jan-May 1970-----	591,750	104,538	8,358	687,930	15.20

<sup>1/</sup> Figures represent shipments by domestic manufacturers of television receivers manufactured in the United States; they do not include shipments of receivers manufactured outside the United States.

<sup>2/</sup> Figures represent imports by domestic manufacturers of television receivers built by or for their domestic label (U.S. label receivers), and all imports of other television receivers (foreign label receivers). See text tabulations on page A-10 for separation of data on U.S. and foreign label imports.

Note.--The figures shown in this table include both monochrome and color television receivers which have a large disparity in average unit value. Because of the changing product mix between the monochrome and color receivers from year to year, average unit values would not have meaning and are not included in this table.

Source: Imports for consumption and exports of domestic merchandise are compiled from official statistics of the U.S. Department of Commerce. U.S. shipments are estimated on the basis of data supplied to the U.S. Tariff Commission by 8 of the 9 largest U.S. producers of television receiver  
\* \* \*

Table 5.--Color television receivers: U.S. shipments, imports for consumption, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970

Year	U.S. shipments <u>1/</u>	U.S. imports for consumption <u>2/</u>	U.S. exports of domestic merchandise	Apparent consumption	Ratio (percent) of imports to consumption
Quantity (1,000 receivers)					
1965-----	2,732:	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1966-----	4,942:	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1967-----	5,578:	318	<u>3/</u>	<u>4/</u> 5,896:	<u>5/</u> 5.39
1968-----	6,018:	666	<u>3/</u>	<u>4/</u> 6,684:	<u>5/</u> 9.96
1969-----	5,789:	912	58	6,643:	13.73
Jan.-May 1969---	2,122:	285	19	2,388:	11.94
Jan.-May 1970---	1,535:	304	15	1,824:	16.67
Value (1,000 dollars)					
1965-----	953,204:	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1966-----	1,798,504:	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1967-----	1,993,450:	53,213	<u>3/</u>	<u>4/</u> 2,046,663	<u>5/</u> 2.60
1968-----	2,098,858:	106,033	<u>3/</u>	<u>4/</u> 2,204,891:	<u>5/</u> 4.81
1969-----	1,941,681:	143,365	20,809	2,064,237:	6.94
Jan.-May 1969---	698,209:	45,338	6,297	737,250:	6.15
Jan.-May 1970---	484,905:	46,292	5,137	526,060:	8.80
Average unit value (dollars per receiver) <u>6/</u>					
1965-----	349:	<u>3/</u>	<u>3/</u>	<u>3/</u>	XXXX
1966-----	364:	<u>3/</u>	<u>3/</u>	<u>3/</u>	XXXX
1967-----	357:	167	<u>3/</u>	<u>4/</u> 347:	XXXX
1968-----	349:	159	<u>3/</u>	<u>4/</u> 330:	XXXX
1969-----	335:	157	359	311:	XXXX
Jan.-May 1969---	329:	159	337	309:	XXXX
Jan.-May 1970---	316:	152	342	288:	XXXX

1/ Figures represent shipments by domestic manufacturers of color television receivers manufactured in the United States; they do not include shipments of color receivers manufactured outside the United States.

2/ Figures represent imports by domestic manufacturers of color television receivers built by or for them for their domestic label (U.S. label receivers) and imports of all other color television receivers (foreign label receivers). Imports of color television receivers incorporated in radio-television-phonograph combination units are not included in these data.

3/ Not available.

4/ Overstated by the amount of exports which are probably not large in relation to consumption.

5/ Understated by the inclusion of export data in the figures on consumption. The actual percentage of understatement is very small in relation to the whole.

6/ Calculated on the basis of unrounded quantity and value figures.

Source: Imports for consumption and exports of domestic merchandise are compiled from official statistics of the U.S. Department of Commerce. U.S. shipments are estimated on the basis of data supplied to the U.S. Tariff Commission by 8 of the 9 largest U.S. producers of television receivers.

\* \* \*



Table 6.--Monochrome television receivers: U.S. shipments, imports for consumption, exports of domestic merchandise, and apparent consumption, 1965-69, and January-May 1969 and 1970

Year	U.S. shipments <u>1/</u>	U.S. imports for consumption	U.S. exports of domestic merchandise	Apparent consumption	Ratio (percent) of imports to consumption
Quantity (1,000 receivers)					
1965-----	7,484	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1966-----	7,754	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1967-----	4,807	1,290	<u>3/</u>	<u>4/</u> 6,097	<u>5/</u> 21.16
1968-----	4,981	2,043	<u>3/</u>	<u>4/</u> 7,024	<u>5/</u> 29.09
1969-----	4,289	3,121	99	7,311	42.69
Jan.-May 1969--	1,773	1,027	35	2,765	37.14
Jan.-May 1970--	1,215	1,192	27	2,380	50.08
Value (1,000 dollars)					
1965-----	795,080	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1966-----	746,170	<u>3/</u>	<u>3/</u>	<u>3/</u>	<u>3/</u>
1967-----	459,094	70,644	<u>3/</u>	<u>4/</u> 529,738	<u>5/</u> 13.34
1968-----	472,006	97,018	<u>3/</u>	<u>4/</u> 569,024	<u>5/</u> 17.05
1969-----	386,112	152,416	12,478	526,050	28.97
Jan.-May 1969--	160,589	49,962	5,377	205,174	24.35
Jan.-May 1970--	106,845	58,174	3,221	161,798	35.96
Average unit value (dollars per receiver)					
1965-----	106	<u>3/</u>	<u>3/</u>	<u>3/</u>	XXX
1966-----	96	<u>3/</u>	<u>3/</u>	<u>3/</u>	XXX
1967-----	96	55	<u>3/</u>	87	XXX
1968-----	95	47	<u>3/</u>	81	XXX
1969-----	90	49	126	72	XXX
Jan.-May 1969--	91	49	152	74	XXX
Jan.-May 1970--	88	49	119	68	XXX

1/ Figures represent shipments by domestic manufacturers of monochrome television receivers manufactured in the United States; they do not include shipments of receivers manufactured outside the United States.

2/ Figures represent imports by domestic manufacturers of monochrome television receivers built by or for them for their domestic label (U.S. label receivers) and imports of all other monochrome television receivers (foreign label receivers). Imports of monochrome television receivers incorporated in radio-television-phonograph combination units are not included in these data.

3/ Not available. Probably small in relation to U.S. shipments and consumption.

4/ Overstated by the amount of exports which are probably not large in relation to consumption.

5/ Understated by the inclusion of export data in the figures on consumption. The actual percentage of understatement is very small in relation to the whole.

6/ Calculated on the basis of unrounded quantity and value figures.

Source: Imports for consumption and exports of domestic merchandise are compiled from official statistics of the U.S. Department of Commerce. U.S. shipments are estimated on the basis of data supplied to the U.S. Tariff Commission by 8 of the 9 largest U.S. producers of television receivers. \* \* \*





